RAW SEQUENCE LISTING

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) no errors detected.

Application Serial Number: 10/581,183
Source: IFW P
Date Processed by STIC: 6/19/06

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IFWP

RAW SEQUENCE LISTING DATE: 06/19/2006
PATENT APPLICATION: **US/10/581,183** TIME: 11:23:11

Input Set : **A:\14875-162US1.txt**
Output Set: **N:\CRF4\06192006\J581183.raw**

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      3 <110> APPLICANT: Tsunoda, Hiroyuki
      4       Habu, Kiyoshi
      6 <120> TITLE OF INVENTION: EXPRESSION SYSTEMS USING MAMMALIAN BETA-ACTIN
PROMOTER
      8 <130> FILE REFERENCE: 14875-162US1
C--> 10 <140> CURRENT APPLICATION NUMBER: US/10/581,183
C--> 10 <141> CURRENT FILING DATE: 2006-06-01
     10 <150> PRIOR APPLICATION NUMBER: PCT/JP2004/018006
     11 <151> PRIOR FILING DATE: 2004-12-03
     13 <150> PRIOR APPLICATION NUMBER: JP 2003-405269
     14 <151> PRIOR FILING DATE: 2003-12-03
     16 <160> NUMBER OF SEQ ID NOS: 39
     18 <170> SOFTWARE: PatentIn version 3.1
     20 <210> SEQ ID NO: 1
     21 <211> LENGTH: 1577
     22 <212> TYPE: DNA
     23 <213> ORGANISM: Mus musculus
     25 <400> SEQUENCE: 1
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     30 acatccacac ccagagggtc ctggggtggt tgggtgaccc ccagaatgca ggcctagtaa    180
     32 ccgagacatt gaatggggca gtgtccacaa gggcggaggc tattcctgta catctgggcc    240
     34 tacggagcca gcacccatcg ccaaaactct tcatcctctt cctcaatctc gctttctctc    300
     36 tcgctttttt ttttttttct tcttcttttt ttttttttt ttcaaaagga ggggagaggg    360
     38 ggtaaaaaaa tgctgcactg tgcggcgagg ccggtgagtg agcgacgcgg agccaatcag    420
     40 cgcccgccgt tccgaaagtt gcctttttatg gctcgagtgg ccgctgtggc gtcctataaa    480
     42 acccggcggc gcaacgcgca gccactgtcg agtcgcgtcc acccgcgagc acagcttctt    540
     44 tgcagctcct tcgttgccgg tccacacccg ccaccaggta agcagggacg ccgggcccag    600
     46 cgggccttcg ctctctcgtg gctagtacct cactgcaggg tcctgaggat cactcagaac    660
     48 ggacaccatg ggcgggtgga gggtggtgcc gggccgcgga gcggacactg gcacagccaa    720
     50 ctttacgcct agcgtgtaga ctctttgcag ccacattccc gcggtgtaga cactcgtggg    780
     52 cccgctcccg ctcggtgcgt ggggcttggg gacacactag ggtcgcggtg tgggcatttg    840
     54 atgagccggt gcggcttgcg ggtgttaaaa gccgtattag gtccatcttg agagtacaca    900
     56 gtattgggaa ccagacgcta cgatcacgcc tcaatggcct ctgggtcttt gtccaaaccg    960
     58 gtttgcctat tcggcttgcc gggcgggcgg gcgggcgggc gggcgcggca gggccggctc   1020
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Input Set : **A:\14875-162US1.txt**
Output Set: **N:\CRF4\06192006\J581183.raw**

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86 <400> SEQUENCE: 2
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89 caaatagggt ccgggcctcg atgctgaccc tcatccactt aagtgctcga tatccacgtg 120
91 acatccacac ccagagggtc ctggggtggt tgggtgaccc ccagaatgca ggcctagtaa 180
93 ccgagacatt gaatggggca gtgtccacaa gggcggaggc tattcctgta catctgggcc 240
95 tacggagcca gcacccatcg ccaaaactct tcatcctctt cctcaatctc gctttctctc 300
97 tcgctttttt ttttttttct tcttcttttt ttttttttct ttcaaaagga ggggagaggg 360
99 ggtaaaaaaa tgctgcactg tgcggcgagg ccggtgagtg agcgacgcgg agccaatcag 420
101 cgcccgccgt tccgaaagtt gccttttatg gctcgagtgg ccgctgtggc gtcctataaa 480
103 acccggcggc gcaacgcgca gccactgtcg agtcgcgtcc acccgcgagc acagcttctt 540
105 tgcagctcct tcgttgccgg tccacacccg ccaccaggta agcagggacg ccgggcccag 600
107 cgggccttcg ctctctcgtg gctagtacct cactgcaggg tcctgaggat cactcagaac 660
109 ggacaccatg ggcgggtgga gggtggtgcc gggccgcgga gcggacactg gcacagccaa 720
111 ctttacgcct agcgtgtaga ctctttgcag ccacattccc gcggtgtaga cactcgtggg 780
113 cccgctcccg ctcggtgcgt ggggcttggg gacacactag ggtcgcggtg tgggcatttg 840
115 atgagccggt gcggcttgcg ggtgttaaaa gccgtattag gtccatcttg agagtacaca 900
117 gtattgggaa ccagacgcta cgatcacgcc tcaatggcct ctgggtcttt gtccaaaccg 960
119 gtttgcctat tcggcttgcc gggcgggcgg gcgggcgggc gggcgcggca gggccggctc 1020
121 ggccgggtgg gggctgggat gccactgcgc gtgcgctctc tatcactggg catcgaggcg 1080
123 cgtgtgcgct agggagggag ctcttcctct ccccctcttc ctagttagct gcgcgtgcgt 1140
125 attgaggctg ggagcgcggc tgcccggggt tgggcgaggg cggggccgtt gtccggaagg 1200
127 ggcggggtca cagtggcacg ggcgccttgt ttgcgcttcc tgctgggtgt ggtcgcctcc 1260
129 cgcgcgcgca caagccgccc gtcggcgcag tgtaggcgga gcttgcgccc gtttggggag 1320
131 ggggcggagg tctggcttcc tgccctaggt ccgcctccgg gccagcgttt gcctttatg 1380
133 gtaataatgc ggccggtctg cgcttccttt gtcccctgag cttgggcgcg cgccccctgg 1440
135 cggctcgagc ccgcggcttg ccggaagtgg gcagggcggc agcggctgct cttggcggcc 1500
137 ccgaggtgac tatagccttc ttttgtgtct tgatagttcg cc 1542
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141 <211> LENGTH: 604
142 <212> TYPE: DNA
143 <213> ORGANISM: Woodchuck hepatitis virus
145 <400> SEQUENCE: 3
146 tctagaaatc aacctctgga ttacaaaatt tgtgaaagat tgactggtat tcttaactat 60
148 gttgctcctt ttacgctatg tggatacgct gctttaatgc ctttgtatca tgctattgct 120
150 tcccgtatgg ctttcatttt ctcctccttg tataaatcct ggttgctgtc tctttatgag 180
152 gagttgtggc ccgttgtcag gcaacgtggc gtggtgtgca ctgtgtttgc tgacgcaacc 240
154 cccactggtt ggggcattgc caccacctgt cagctccttt ccgggacttt cgctttcccc 300
156 ctccctattg ccacggcgga actcatcgcc gcctgccttg cccgctgctg gacaggggct 360
158 cggctgttgg gcactgacaa ttccgtggtg ttgtcgggga agctgacgtc ctttccatgg 420
160 ctgctcgcct gtgttgccac ctggattctg cgcgggacgt ccttctgcta cgtcccttcg 480
162 gccctcaatc cagcggacct tccttcccgc ggcctgctgc cggctctgcg gcctcttccg 540
164 cgtcttcgcc ttcgccctca gacgagtcgg atctcccttt gggccgcctc cccgcctgtc 600
166 taga 604
169 <210> SEQ ID NO: 4

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170 <211> LENGTH: 366
171 <212> TYPE: DNA
172 <213> ORGANISM: Homo sapiens
174 <400> SEQUENCE: 4
175 tagttattaa tagtaatcaa ttacggggtc attagttcat agcccatata tggagttccg 60
177 cgttacataa cttacggtaa atggcccgcc tggctgaccg cccaacgacc cccgcccatt 120
179 gacgtcaata atgacgtatg ttcccatagt aacgccaata gggactttcc attgacgtca 180
181 atgggtggag tatttacggt aaactgccca cttggcagta catcaagtgt atcatatgcc 240
183 aagtacgccc cctattgacg tcaatgacgg taaatggccc gcctggcatt atgcccagta 300
185 catgacctta tgggactttc ctacttggca gtacatctac gtattagtca tcgctattac 360
187 catggt 366
190 <210> SEQ ID NO: 5
191 <211> LENGTH: 660
192 <212> TYPE: DNA
193 <213> ORGANISM: Mus musculus
195 <400> SEQUENCE: 5
196 tcctggattg gcagccgctg tagaagctat gacagaatac aagcttgtgg tggtgggcgc 60
198 tggaggcgtg ggaaagagtg ccctgaccat ccagctgatc cagaaccact ttgtggacga 120
200 gtatgatccc actatagagg actcctaccg gaaacaggtg gtcattgatg gggagacatg 180
202 tctactggac atcttagaca cagcaggtca agaagagtat agtgccatgc gggaccagta 240
204 catgcgcaca ggggagggct tcctctgtgt atttgccatc aacaacacca agtccttcga 300
206 ggacatccat cagtacaggg agcagatcaa gcgggtgaaa gattcagatg atgtgccaat 360
208 ggtgctggtg ggcaacaagt gtgacctggc tgctcgcact gttgagtctc ggcaggccca 420
210 ggaccttgct cgcagctatg gcatccccta cattgaaaca tcagccaaga cccggcaggg 480
212 cgtggaggat gccttctata cactagtccg tgagattcgg cagcataaat tgcggaaact 540
214 gaacccaccc gatgagagtg gtcctggctg catgagctgc aaatgtgtgc tgtcctgaca 600
216 ccaggtgagg cagggaccag cgagacgtct ggggcagtga cctcagctag ccagatgaac 660
219 <210> SEQ ID NO: 6
220 <211> LENGTH: 576
221 <212> TYPE: DNA
222 <213> ORGANISM: Mus musculus
224 <400> SEQUENCE: 6
225 gccaccatga cagaatacaa gcttgtggtg gtgggcgctg gaggcgtggg aaagagtgcc 60
227 ctgaccatcc agctgatcca gaaccacttt gtggacgagt atgatcccac tatagaggac 120
229 tcctaccgga aacaggtggt cattgatggg gagacatgtc tactggacat cttagacaca 180
231 gcaggtcaag aagagtatag tgccatgcgg gaccagtaca tgcgcacagg ggagggcttc 240
233 ctctgtgtat ttgccatcaa caacaccaag tccttcgagg acatccatca gtacagggag 300
235 cagatcaagc gggtgaaaga ttcagatgat gtgccaatgg tgctggtggg caacaagtgt 360
237 gacctggctg ctcgcactgt tgagtctcgg caggcccagg accttgctcg cagctatggc 420
239 atcccctaca ttgaaacatc agccaagacc cggcagggcg tggaggatgc cttctataca 480
241 ctagtccgtg agattcggca gcataaattg cggaaactga acccacccga tgagagtggt 540
243 cctggctgca tgagctgcaa atgtgtgctg tcctga 576
246 <210> SEQ ID NO: 7
247 <211> LENGTH: 189
248 <212> TYPE: PRT
249 <213> ORGANISM: Mus musculus
251 <400> SEQUENCE: 7
252 Met Thr Glu Tyr Lys Leu Val Val Val Gly Ala Val Gly Val Gly Lys
253 1 5 10 15

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255 Ser Ala Leu Thr Ile Gln Leu Ile Gln Asn His Phe Val Asp Glu Tyr
256             20                  25                  30
258 Asp Pro Thr Ile Glu Asp Ser Tyr Arg Lys Gln Val Val Ile Asp Gly
259         35                  40                  45
261 Glu Thr Cys Leu Leu Asp Ile Leu Asp Thr Ala Gly Gln Glu Glu Tyr
262     50                  55                  60
264 Ser Ala Met Arg Asp Gln Tyr Met Arg Thr Gly Glu Gly Phe Leu Cys
265 65                  70                  75                  80
267 Val Phe Ala Ile Asn Asn Thr Lys Ser Phe Glu Asp Ile His Gln Tyr
268                 85                  90                  95
270 Arg Glu Gln Ile Lys Arg Val Lys Asp Ser Asp Asp Val Pro Met Val
271             100                 105                 110
273 Leu Val Gly Asn Lys Cys Asp Leu Ala Ala Arg Thr Val Glu Ser Arg
274         115                 120                 125
276 Gln Ala Gln Asp Leu Ala Arg Ser Tyr Gly Ile Pro Tyr Ile Glu Thr
277     130                 135                 140
279 Ser Ala Lys Thr Arg Gln Gly Val Glu Asp Ala Phe Tyr Thr Leu Val
280 145                 150                 155                 160
282 Arg Glu Ile Arg Gln His Lys Leu Arg Lys Leu Asn Pro Pro Asp Glu
283                 165                 170                 175
285 Ser Gly Pro Gly Cys Met Ser Cys Lys Cys Val Leu Ser
286             180                 185
289 <210> SEQ ID NO: 8
290 <211> LENGTH: 188
291 <212> TYPE: PRT
292 <213> ORGANISM: Homo sapiens
294 <400> SEQUENCE: 8
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298 Ser Ala Leu Thr Ile Gln Leu Ile Gln Asn His Phe Val Asp Glu Tyr
299             20                  25                  30
301 Asp Pro Thr Ile Glu Asp Ser Tyr Arg Lys Gln Val Val Ile Asp Gly
302         35                  40                  45
304 Glu Thr Cys Leu Leu Asp Ile Leu Asp Thr Ala Gly Gln Glu Glu Tyr
305     50                  55                  60
307 Ser Ala Met Arg Asp Gln Tyr Met Arg Thr Gly Glu Gly Phe Leu Cys
308 65                  70                  75                  80
310 Val Phe Ala Ile Asn Asn Thr Lys Ser Phe Glu Asp Ile His His Tyr
311                 85                  90                  95
313 Arg Glu Gln Ile Lys Arg Val Lys Asp Ser Glu Asp Val Pro Met Val
314             100                 105                 110
316 Leu Val Gly Asn Lys Cys Asp Leu Pro Ser Arg Thr Val Asp Thr Lys
317         115                 120                 125
319 Gln Ala Gln Asp Leu Ala Arg Ser Tyr Gly Ile Pro Phe Ile Glu Thr
320     130                 135                 140
322 Ser Ala Lys Thr Arg Gln Gly Val Asp Asp Ala Phe Tyr Thr Leu Val
323 145                 150                 155                 160
325 Arg Glu Ile Arg Lys His Lys Glu Lys Met Ser Lys Asp Gly Lys Lys
326                 165                 170                 175
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Input Set : A:\14875-162US1.txt
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329 180 185
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333 <211> LENGTH: 27
334 <212> TYPE: DNA
335 <213> ORGANISM: Artificial
337 <220> FEATURE:
338 <223> OTHER INFORMATION: Description of Artificial Sequence : Artificially Synthesized Pri
339 mer Sequence
341 <400> SEQUENCE: 9
342 gggagtgact ctctgtccat tcaatcc 27
345 <210> SEQ ID NO: 10
346 <211> LENGTH: 27
347 <212> TYPE: DNA
348 <213> ORGANISM: Artificial
350 <220> FEATURE:
351 <223> OTHER INFORMATION: Description of Artificial Sequence : Artificially Synthesized Pri
352 mer Sequence
354 <400> SEQUENCE: 10
355 ttgtcgacga ccagcgcagc gatatcg 27
358 <210> SEQ ID NO: 11
359 <211> LENGTH: 26
360 <212> TYPE: DNA
361 <213> ORGANISM: Artificial
363 <220> FEATURE:
364 <223> OTHER INFORMATION: Description of Artificial Sequence : Artificially Synthesized Pri
365 mer Sequence
367 <400> SEQUENCE: 11
368 agatctggga gtgactctct gtccat 26
371 <210> SEQ ID NO: 12
372 <211> LENGTH: 26
373 <212> TYPE: DNA
374 <213> ORGANISM: Artificial
376 <220> FEATURE:
377 <223> OTHER INFORMATION: Description of Artificial Sequence : Artificially Synthesized Pri
378 mer Sequence
380 <400> SEQUENCE: 12
381 aagcttggcg aactatcaag acacaa 26
384 <210> SEQ ID NO: 13
385 <211> LENGTH: 50
386 <212> TYPE: DNA
387 <213> ORGANISM: Artificial
389 <220> FEATURE:
390 <223> OTHER INFORMATION: Description of Artificial Sequence : Artificially Synthesized Pri
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393 <400> SEQUENCE: 13
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397 <210> SEQ ID NO: 14

398 <211> LENGTH: 50

RAW SEQUENCE LISTING ERROR SUMMARY DATE: 06/19/2006
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Input Set : **A:\14875-162US1.txt**
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Invalid <213> Response:
Use of "Artificial" only as "<213> Organism" response is incomplete, per 1.823(b) of New Sequence Rules. Valid response is Artificial Sequence.

Seq#:9,10,11,12,13,14,15,16,17,18,19,20,21,22,23,24,25,26,27,28,29,30,31,32,33
Seq#:34,35,36,37,38,39

VERIFICATION SUMMARY DATE: 06/19/2006
PATENT APPLICATION: **US/10/581,183** TIME: 11:23:13

Input Set : **A:\14875-162US1.txt**
Output Set: **N:\CRF4\06192006\J581183.raw**

L:10 M:270 C: Current Application Number differs, Replaced Current Application No
L:10 M:271 C: Current Filing Date differs, Replaced Current Filing Date